# IN THE UNITED STATES PATENT AND TRADEMARK OFFICE BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

In re Application of Daniel STEIGER et al.

Docket No.: EIS.009

**Serial No.**: 10/585,132

Art Unit: 1794

Filed: June 30, 2006

Examiner: Lela Williams

For: METHOD FOR INSTANTISATION OF COCONUT MILK POWDER

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

#### APPEAL BRIEF UNDER 37 C.F.R. §1.192

Sir:

This is an appeal pursuant to 35 U.S.C. 134 from the Examiner's decision rejecting claims 1, 2, 4 and 5 as set forth in the final Office Action dated May 10, 2011.

## I. Real party in interest.

The real party in interest is the Assignee of record, Degussa Texturant Systems

Deutschland GmbH & Co. KG, having a place of business at Ausschlager Elbdeich 62,

Hamburg, Germany D-20539.

## II. Related appeals and interferences.

None.

## III. Status of claims.

Claims 1, 2, 4 and 5 stand rejected by the Examiner and are the subject of this appeal.

Claim 3 was cancelled.

## IV. Status of amendments.

No amendments were filed after the final Office Action from which this appeal is taken.

#### V. Summary of claimed subject matter.

#### Independent claim 1

Claim 1 is drawn to a method for the instantisation of powders for use in food stuff and animal feed production (Abstract; page 2, third through sixth paragraphs of the application as published), the particles of which comprise free surface fat (Abstract; page 1, first and second paragraphs; page 2, third through sixth paragraphs; page 3, second paragraph; and page 5, first paragraph), wherein lecithin and alginate in water or an aqueous liquid (Abstract; page 2, third through sixth paragraphs; page 3, second paragraph; and page 6, fourth paragraph.) are sprayed onto the powder particles and dried subsequently (Abstract; page 2, third through sixth paragraphs; and page 3, first paragraph).

#### Independent claim 2

Independent claim 2 is drawn to a method for the instantisation of powders for use in food stuff and animal feed production (Abstract; page 2, third through sixth paragraphs of the application as published), the particles of which comprise free surface fat (Abstract; page 1, first and second paragraphs; page 2, third through sixth paragraphs; page 3, second paragraph; and page 5, first paragraph), wherein lecithin and alginate in water or in an aqueous liquid are sprayed onto the powder particles, the powder particles agglomerate (page 2, third through sixth paragraphs; and page 3, first paragraph) and are dried subsequently (Abstract; page 2, third through sixth paragraphs; and page 3, first paragraph).

#### Dependent claim 4

Dependent claim 4 depends on claim 1 and recites "wherein the free surface fat is that of coconut milk powder" (page 1, second paragraph; and page 2, third through sixth paragraphs).

#### Dependent claim 5

Dependent claim 5 depends on claim 2 and recites "wherein the free surface fat is that of coconut milk powder" (page 1, second paragraph; and page 2, third through sixth paragraphs).

## VI. Grounds of rejection to be reviewed on appeal.

The ground of rejection for review is the rejection of claims 1, 2, 4 and 5 under 35 U.S.C. 103(a) as being unpatentable over Cajigas (US 4,289,788) in view of Fitzpatrick et al. (GB 2,035,035), as evidenced by http://www.wisegeek.com/what-is-coconut-milk.htm.

### VII. Argument

#### Independent claim 1

In rejecting claims 1, 2, 4 and 5 under 35 USC 103 as being obvious over the Cajigas reference in view of the Fitzpatrick reference, as evidenced by http://www.wisegeek.com/what-is-coconut-milk.htm, the Examiner states that Cajigas discloses a method of making instant powders wherein alginate and lecithin are applied to yogurt powders. The appellants point out that what Cajigas discloses about the application of alginate and lecithin to yogurt powders is that alginate, lecithin and yogurt powders are all ingredients of a composition that may be admixed in any apparatus well known in the art, including apparatus for dry blending and spray drying. To be dry blended, the ingredients must first be dried. With spray drying, the drying and blending operations are carried out in a single operation, and Cajigas prefers spray drying for that reason (column 8, lines 1-7). Cajigas provides no specific description of any application of alginate and lecithin to yogurt powders, and the appellants submit that no details of any such application can be inferred.

With respect to spray drying, reference is made to *In re Spormann and Heinke*, 150 U.S.P.Q. 449 (CCPA 1966), in which Judge Rich stated: "While we have heard of spray drying, it is not a technique of which we would feel free to take judicial notice. We are of the opinion that if the Patent Office wishes to rely on what 'Those familiar with spray drying would know,' it must produce some reference showing what such knowledge consists of". Although the appellants understand that judicial notice is not an issue here, because spray drying is disclosed in Cajigas, the statement by Judge Rich makes clear that the mere disclosure of "spray drying" in Cajigas discloses little about any application of alginate and lecithin to yogurt powders.

With respect to the alginate of claim 1, the appellants point out that Cajigas discloses that

its composition includes a gelling agent and that sodium alginate can be used as the gelling agent (column 4, lines 24-27). Although sodium alginate is a gum, lines 44-50 of column 4 of Cajigas disclose that sodium alginate is available in powder form for use as a thickener and emulsifier in such foods as ice cream. However, the Cajigas reference does not disclose that the sodium alginate is placed in water or an aqueous liquid and sprayed onto powder particles.

With respect to the lecithin of claim 1, the Examiner refers to a statement in Cajigas (column 6, line 26) that lecithin acts as an agent to wet or hydrate the whey protein absorption layer around the casein, and she contends that such a statement makes it obvious that the lecithin is applied as a liquid. The Cajigas reference discloses in column 2, lines 58-62 that its invention provides an instant powdered composition that comprises a mixture of deactivated yogurt powder, Lactobacillus culture, a gelling agent, a hydrocolloid gum, and a food acidulent.

Although the Examiner uses the term "obvious" in connection with lecithin being applied as a liquid, it appears that the Examiner is not using that term as it relates to 35 USC 103. Instead, from the context of its use, it appears that the Examiner is using that term to mean that the statement in line 26 of column 6 of Cajigas makes it clear that the lecithin is applied as a liquid.

The appellants submit that it is neither clear nor inherent that the lecithin of Cajigas is applied as a liquid, much less that the lecithin in water or in an aqueous liquid is sprayed onto the powder particles, as is recited in claim 1 on appeal. Cajigas does not disclose that the lecithin is applied as a liquid. With respect to the Examiner's contention that the statement in Cajigas (column 6, line 26) that lecithin acts as an agent to wet or hydrate the whey protein absorption layer around the casein makes it obvious that the lecithin is applied as a liquid, the appellants submit that an agent to wet or hydrate does not mean that the agent itself is wet. Wetting agents can be dry. The statement in Cajigas that lecithin acts as an agent to wet or hydrate means that

the lecithin helps other liquids wet or hydrate the whey protein absorption layer, rather than meaning that the lecithin itself is applied wet to the whey protein absorption layer. Furthermore, even if Cajigas disclosed lecithin being applied wet, that would not be a disclosure of lecithin in water or an aqueous liquid. If the targeted material in Cajigas is going to be reconstituted in water, the lecithin at the surface of the material helps to overcome the interfacial tension between the target material and the water used for reconstitution, thus resulting in wetting of the target material. The lecithin is the enhancer, that is, the wetting agent, that makes wetting happen.

The Encyclopedia Britannica defines a "wetting agent" as a chemical substance that increases the spreading and penetrating properties of a liquid by lowering its surface tension - that is, the tendency of its molecules to adhere to each other. Thus, the statement in Cajigas that lecithin acts as an agent to wet or hydrate does not render it clear that the lecithin itself is applied wet to the whey protein absorption layer. Accordingly, Cajigas does not disclose that the lecithin itself is applied wet. More specifically, Cajigas does not disclose that lecithin in water or an aqueous liquid is sprayed onto powder particles. Claim 1 on appeal recites lecithin "in water or an aqueous liquid" being sprayed onto powder particles.

Furthermore, it cannot be said that Cajigas inherently discloses lecithin "in water or an aqueous liquid" being sprayed onto powder particles. To establish inherency, the extrinsic evidence "must make clear that the missing descriptive matter is necessarily present in the thing described in the reference, and that it would be so recognized by persons of ordinary skill."

\*\*Continental Can Co. v. Monsanto Co., 948 F.2d 1264, 1268, 20 U.S.P.Q.2D (BNA) 1746, 1749

(Fed. Cir. 1991). "Inherency, however, may not be established by probabilities or possibilities.

The mere fact that a certain thing may result from a given set of circumstances is not sufficient."

\*\*Id. at 1269, 20 U.S.P.Q.2D (BNA) at 1749 (quoting \*\*In re Oelrich\*, 666 F.2d 578, 581, 212)\*\*

<u>U.S.P.Q. 323, 326 (C.C.P.A. 1981)</u>). In the present application, the extrinsic evidence does not make clear that the missing descriptive matter, lecithin "in water or an aqueous liquid" being sprayed onto powder particles, is necessarily present in the method described in the Cajigas reference, and persons of ordinary skill would not recognize that the lecithin of Cajigas is necessarily applied in that way. Lecithin in water or an aqueous liquid being sprayed onto powder particles is not necessarily present in the method of Cajigas but, at most, is only a possibility.

At the bottom of the first paragraph on page 4 of the final Office Action, the Examiner states that it is her position that the form of lecithin, either liquid or dry, holds no patentable weight given that both will perform in the same manner once applied to powders. The appellants point out that claim 1 on appeal recites "lecithin... in water or an aqueous liquid" being sprayed onto the powder particles. The appellants further point out that whether the lecithin is applied dry or in water or an aqueous liquid makes a difference. One reason is that the polar lipids of the lecithin need to be evenly spread on the surface of the powder particles. Otherwise, the result will be a powder product with no instant properties at all. Spraying lecithin in water or an aqueous liquid onto the powder particles causes the polar lipids of the lecithin to be evenly spread on the surface of the powder particles does not result in the polar lipids being evenly spread on the surface of the powder particles. Therefore, dry blending of lecithin with another powder for purposes of instantisation is not an option.

Moreover, the Examiner contends that one of ordinary skill would have been motivated by the teaching of Fitzpatrick to apply both the lecithin and alginate of Cajigas by combining with water and spraying the components onto the powder particles in efforts to control the viscosity of the final product. However, the appellants point out that Fitzpatrick actually teaches away from using the process of Fitzpatrick with the invention of Cajigas. More specifically, Cajigas relates to instant yogurt, whereas Fitzpatrick relates to the production of a full cream milk powder. In this regard, Fitzpatrick discloses that milk powders that contain a low level of fat, by which is meant less than about 10%, can normally be made instant by a procedure in which the powder is made to form into granules by wetting and then drying. Fitzpatrick further discloses that its process is for milk powders with a fat content in excess of 10%, which cannot be made instant by a procedure in which the powder is made to form into granules by wetting and then drying (page 1, lines 5-21). Cajigas discloses that its invention provides an instant powdered composition comprising a mixture of deactivated yogurt powder and other ingredients, and also provides a process for preparing the composition (column 2, lines 58-66). Yogurt powder typically has a fat content of 1.25 % – 2.0 %. Submitted herewith is a copy of "Yogurt Powder Ingredients" from the U.S. Dairy Export Council indicating that yogurt powder typically has a fat content of 1.25 % – 2.0 %.

Since Fitzpatrick discloses that milk powders that contain a low level of fat, by which is meant less than about 10%, can normally be made instant without the Fitzpatrick process, and that the Fitzpatrick process is for milk powders with a fat content in excess of 10%, Fitzpatrick does not provide any motivation to apply either the lecithin of Cajigas or alginate by combining with water and spraying the components onto the powder particles in efforts to control the viscosity of the final product of Cajigas. Instead, Fitzpatrick teaches there is no need to use his process for powders having a fat content of less than about 10%. Thus, Fitzpatrick teaches away from using his process for yogurt powder, which typically has a fat content of 1.25 % -2.0 %, and it would not have been obvious to use the Fitzpatrick process with the yogurt powder of Cajigas.

The Fitzpatrick reference would provide no motivation, suggestion or teaching to one of ordinary skill in the art considering the Cajigas process, which is for preparing an instant yogurt preparation, to use that process in connection with the Fitzpatrick method. Since Fitzpatrick states that milk powders containing a level of fat less than about 10% can be made instant via procedure in which the powder is made to form into granules by wetting and then drying, and therefore, by implication, do not require the method of Fitzpatrick, there would have been no motivation, suggestion or teaching to use the method of Fitzpatrick with the process of Cajigas involving yogurt powder having a fat content of much less than 10%.

In view of the foregoing, the appellants submit that the Examiner has not explained any valid motivation, suggestion or teaching that would have led one of ordinary skill to use the method of Fitzpatrick with the Cajigas yogurt powder having a fat content of much less than 10%. In this regard, in *In re Kahn*, 441 F.3d 977; 2006 U.S. App. LEXIS 7070; 78 U.S.P.Q.2D (BNA) 1329 (Fed. Cir. 2006), the court stated:

"When the Board does not explain the motivation, or the suggestion or teaching, that would have led the skilled artisan at the time of the invention to the claimed combination as a whole, we infer that the Board used hindsight to conclude that the invention was obvious. *Id.* at 1358. The 'motivation-suggestion-teaching' requirement protects against the entry of hindsight into the obviousness analysis, a problem which § 103 was meant to confront. *See* 35 U.S.C. § 103 (stating that obviousness must be assessed 'at the time the invention was made'); *Dembiczak*, 175 F.3d at 998 ('It is this phrase that guards against entry into the tempting but forbidden zone of hindsight.' (internal quotations omitted))"

Accordingly, the appellants submit that the Examiner's proposal to use the method of Fitzpatrick

with the Cajigas yogurt powder is arrived at only through hindsight.

On page 4 of the final Office Action, the Examiner states that Fitzpatrick does not teach away from using its process with the invention of Cajigas. The Examiner's basis for this conclusion is that Fitzpatrick does not state that its process can not be utilized with milk powders which contain a low level of fat (emphasis by the Examiner). The appellants submit that the principle of teaching away does not require an explicit statement that something from one reference cannot be used with another reference. Instead, "A reference may be said to teach away when a person of ordinary skill, upon reading the reference, would be discouraged from following the path set out in the reference, or would be led in a direction divergent from the path that was taken by the applicant." In re Kahn, 441 F.3d 977, 990 (Fed. Cir. 2006) (citations and internal quotation marks omitted); (Ricoh Co., Ltd. v. Quanta Computer Inc., 550 F.3d 1325, 1332 (Fed. Cir. 2008)). Since Fitzpatrick discloses that milk powders that contain less than about 10% can normally be made instant by a procedure in which the powder is made to form into granules by wetting and then drying, and since the yogurt powder of Cajigas typically has a fat content of 1.25 % – 2.0 %, a person of ordinary skill, upon reading Fitzpatrick, would be discouraged from following the path set out by Fitzpatrick, because Fitzpatrick teaches that the additional time, effort and expense of the Fitzpatrick method are unnecessary for the yogurt powder of Cajigas.

The present invention relates to a method to improve the instantisation process, especially with regard to good wettability with water or aqueous liquids. By "good wettability" is meant wettability within the shortest time (page 2, third paragraph). The present application acknowledges that it is known to use an emulsifying agent, for example lecithin, in the instantisation (page 1, third paragraph). The present application also acknowledges that alginates

are used in food stuffs due to their special properties in gelatinization, as a thickening agent, as a stabilizer, and to adjust the viscosity of liquids (paragraph bridging pages 1 and 2; and page 2, first paragraph). However, the application indicates that the use of alginates in <u>instantisation</u> was not known prior to the present invention, and that the reason for this deficiency in the prior art is that the addition of alginates to fluids causes the fluids to thicken and become very highly viscous even when low amounts are added, and this counteracts the instantisation (page 2, second paragraph).

The appellants found that merely applying moisture to powder having high free surface fat, such as coconut milk powder, provided almost no positive effect with respect to the instance properties. Wettability was not improved; only dispersibility was improved. This was unexpected. Only in combination with lecithin was improvement in the instant properties visible, but the overall instant behavior of the final product still was not satisfactory. Then, an alternative route to change the instant behavior of powders having very high free surface fat was sought. The challenge was finding something that could be used at low dosages in order not to change the composition of the powder, e.g., coconut milk powder, significantly. Hydrocolloids, such as alginates, seemed to be a possibility, even though hydrocolloids even when applied at low dosages in water build up very viscose to solid solutions or gels. However, when an alginate dissolved in water was sprayed onto coconut powder to build agglomerates, the alginate surprisingly showed some wetting effect. However, even though the use of the alginate achieved a similar particles size distribution (agglomeration rate) as the lecithin approach just described, the alginate approach was less efficient than the lecithin approach. All further trials of, first, agglomerating coconut powder with water or with a water-alginate combination, and then lecithinating it with lecithin either "naturally" in oil or dissolved in oil or fat showed no

significant improvement over the lecithin applied alone and the alginate applied alone that were previously described. It was only by the combination of the lecithin and the alginate in water that a significant improvement was first achieved. This result was entirely unexpected from the results of these various experiments conducted up to that point. There was no reason to believe that such a significant improvement was going to happen.

The present invention relates to a method to improve the instantisation process and addresses the problem that in the addition of alginates to fluids the latter are thickened and assume very high viscosity, even when adding low amounts, which counteracts the instantisation (page 2, first paragraph). The problem addressed by the present invention is not recognized in either Cajigas or Fitzpatrick. In view of the failure of the prior art to recognize the problem addressed by the present invention, the deficiencies in the prior art methods that prompted the present invention were not recognized. Thus, there would have been no reason to modify the method of Cajigas in the manner proposed by the Examiner, even if the modification could have been done. Moreover, one of ordinary skill in the art likely would have chosen a different modification even if he or she had recognized the problem. Spraying lecithin and alginate onto the powder particles in Cajigas amounts to extra work and greater expense for no apparent reason. This is not the same as combining known method steps when each would have been expected to contribute its own known properties to a final product. *In re Omeprazole Patent Litigation*, 536 F. 3d 1361 (Fed. Cir. 2008).

The problem that Cajigas addresses is the production of an instant yogurt that has a texture, taste and nutritional properties very similar to natural yogurt. Cajigas states that no instant yogurt having those characteristics was known prior to the Cajigas invention. There is no indication that Cajigas has any problem with viscosity. On the other hand, viscosity problems

are what Fitzpatrick addresses. There is no suggestion in the Cajigas and Fitzpatrick references considered together that applying lecithin as an aqueous emulsion in Cajigas would help produce an instant yogurt that has a texture, taste and nutritional properties very similar to natural yogurt. Similarly, there is no suggestion in the Cajigas and Fitzpatrick references considered together that applying the sodium alginate of Cajigas as an aqueous emulsion would help produce an instant yogurt that has a texture, taste and nutritional properties very similar to natural yogurt.

The appellants submit that one of ordinary skill in the art at the time of their invention would not have predicted that spraying lecithin and alginate in water or an aqueous liquid onto the powder particles of Cajigas would have resulted in an improvement in the Cajigas method or product. In the paragraph bridging pages 2 and 3 of the Office Action, the Examiner states that one of ordinary skill in the art would have been motivated by the teaching of Fitzpatrick to apply both the lecithin and alginate of Cajigas by combining with water and spraying the components onto the powder particles, in efforts to control the viscosity of the final product. However, the appellants point out that the problem addressed by the spraying of lecithin in Fitzpatrick is only a problem in milk powders having fact contents in excess of 10%. The yogurt powder of Cajigas has a fat content of 1.25% - 2.0%. Accordingly, it would not have been predictable that spraying the lecithin in Cajigas would have had a benefit for the low fat content yogurt powder of Cajigas. Thus, the benefits would not have been predictable to one of ordinary skill in the art, and it would not have been obvious to modify the Cajigas method in the manner proposed by the Examiner.

Although Fitzpatrick discloses that applying the lecithin as an aqueous emulsion overcomes the viscosity problems of milk powders having fat content in excess of 10%, the Examiner's reasoning nonetheless lacks an adequate explanation of why one of ordinary skill in

the art would have been led to spray lecithin onto powder particles, particularly onto particles of a powder having a fat content of much less than 10%. Furthermore, the Examiner's reasoning lacks an adequate explanation of why one of ordinary skill would have been led to spray sodium alginate onto particles of a powder having a fat content of much less than 10%.

In the sentence bridging pages 2 and 3 of the Office Action, the Examiner states that, since it is known that alginate affects viscosity and functions as a thickener, one of ordinary skill would have been motivated by the teaching of Fitzpatrick to apply both the lecithin and alginate of Cajigas by combining with water and spraying the components onto the powder particles. However, Cajigas discloses at column 7, lines 61 – column 8, line 7 that the ingredients of its composition may be admixed in any well-known apparatus, such as for dry blending or spray drying. If dry blending is used, it is not seen how it would be obvious to combine the lecithin and alginate of Cajigas with water and spray the components onto the powder particles. In dry blending, all of the components are dried before blending. As Cajigas discloses in column 8, lines 1-4, to be dry blended, the ingredients first must be dried.

Cajigas prefers spray drying because some of the ingredients of its composition are in the liquid state, and the blending and drying operations are carried out in a single operation. Therefore, spray drying is more economical than dry blending for the Cajigas invention. Both of the methods of admixing disclosed by Cajigas for the Cajigas composition, dry blending and spray drying, teach away from combining the lecithin and alginate in water and spraying them onto powder particles, at least because such steps would have to be in addition to the dry blending and the spray drying.

Also in the sentence bridging pages 2 and 3 of the Office Action, the Examiner states that one of ordinary skill would have been motivated by the teaching of Fitzpatrick to apply both the lecithin and alginate of Cajigas by spraying, in efforts to control the viscosity of the final product.

However, Cajigas discloses that hydrocolloid gum is added to aid in increasing the viscosity when the mix is first reconstituted with water (column 5, lines 8-11). Cajigas further discloses guar gum used in conjunction with xanthan gum for additional viscosity control (column 5, lines 14-16) and carrageenan as another viscosity control agent. Cajigas does not disclose any problem with viscosity, or that any efforts are needed to control the viscosity of its final product.

Furthermore, there is no suggestion in Fitzpatrick that applying both the lecithin and alginate of Cajigas by spraying would control the viscosity of the final product of Cajigas in a way that is desirable for that product.

#### <u>Independent claim 2</u>

The arguments presented in connection with claim 1 also apply to independent claim 2. In addition, claim 2 recites that "the powder particles agglomerate". Thus, agglomeration of the powder particles is part of the method of claim 2. Cajigas wants to avoid agglomeration and uses lecithin to prevent agglomeration. More specifically, Cajigas discloses that the lecithin, by forming a membrane around each fat globule, prevents agglomeration of the fat globules, thus stabilizing the emulsion and adding richness to the mouth feel. Cajigas also discloses that the lecithin, by wetting or hydrating the whey protein absorption layer around the casein, prevents agglomeration of the protein particles. Cajigas further discloses that lecithin prevents agglomeration of the protein particles, which tends to keep the yogurt in a fluid state, and prevents precipitation, grain-like texture, and bitter after-taste in the final product.

#### Dependent claims 4 and 5

With respect to the rejection of claims 4 and 5, the Examiner contends that it would have been obvious to use the method of Cajigas, as modified, with <u>coconut</u> milk. The Appellants submit that it would not have been obvious to use the method of Cajigas with coconut milk for at

least the following reasons. The Cajigas reference, which is titled "Instant Yogurt Composition", does not contemplate the use of its invention with coconut milk. Everything in the Cajigas disclosure involves milk. As was stated earlier herein, Cajigas discloses that its invention provides an instant powdered composition comprising a mixture of deactivated yogurt powder and other ingredients, and also provides a process for preparing the composition (column 2, lines 58-66). The deactivated yogurt powder is essential to the composition of Cajigas, as is reflected in the Field of the Invention of Cajigas (column 1, lines 15-21), which states: "This invention relates generally to food compositions and more particularly to solid instant yogurt compositions in dry particulate form which may be reconstituted by admixture with water or water and milk to provide a product of acceptable texture and flavor and having high nutritional and medicinal value." The Summary of the Prior Art in the Cajigas reference is all directed to yogurt and problems associated with yogurt. One object of the invention of Cajigas is "to provide a packaged instant yogurt preparation...", and another object is "to provide a process for preparing an instant yogurt preparation". Cajigas discloses additional details about yogurt in column 1, lines 23-31 and 56-64 and in column 3, lines 48-50. Since the treating of coconut milk with the method of Cajigas would produce neither yogurt nor the deactivated yogurt powder that is essential to the composition of Cajigas, there would have been no motivation for one of ordinary skill to apply the Cajigas method to coconut milk. There is no hint in Cajigas that the invention it discloses should be applied to coconut milk.

The Internet webpage reference cited by the Examiner, What is Coconut Milk, with an effective date of November 2010, is not prior art with respect to the present application. Thus, its disclosure cannot be used to reject claims of the present application. Furthermore, even if What is Coconut Milk were prior art with respect to the present invention, it contains no

suggestion to indicate to one of ordinary skill that it would have been obvious to use the Cajigas disclosure with coconut milk. There is nothing in the combination of Cajigas and *What is Coconut Milk* to suggest the desirability of using the Cajigas disclosure with coconut milk. In this regard, the appellants refer to *In re Imperato*, 179 USPQ 730 (CCPA 1973), in which Chief Judge Markey said: "However, the fact that those disclosures *can* be combined does not make the combination obvious unless the art also contains something to suggest the desirability of the combination" (emphasis in the original).

In the second paragraph on page 3 of the Office Action, the Examiner states that, because the reference does not limit the milk component to a specific type or teach against any type of milk, including coconut milk, it would have been obvious to choose any type of dried milk, including coconut milk, to achieve the desired health benefits. The health benefits of coconut milk are not reasons why it would have been obvious to use the Cajigas disclosure with coconut milk. The appellants point out that, although the instant yogurt composition of Cajigas, the instantised milk powder of Fitzpatrick, and coconut milk all have health benefits, the achievement of health benefits is not an object of the method of either Cajigas or Fitzpatrick. Instead, the health benefits are inherent in the final products of those references. Thus, although coconut milk may be easily metabolized by the body and may be anti-carcinogenic, anti-microbial, anti-viral, and may contain lauric acid, which may promote brain and bone health, as the Examiner states, those facts provide no motivation for one of ordinary skill to apply the Cajigas method for producing an instant yogurt composition, as modified by Fitzpatrick's method for producing instantised milk powder, to coconut milk rather than cow's milk.

Without valid supportive reasoning as to why the combination of references would have been obvious, the contention that the combination of references would have been obvious is an unsupported conclusion. It is submitted that more than a description of health benefits of coconut milk, such as that provided by the Examiner, is needed to set forth a *prima facie* case of obviousness. Instead, some valid supportive reasoning why the combination of references would have been obvious is required. In this regard, the court in *In re Kahn*, 78 USPQ2d 1329 (Fed. Cir. 2006) stated: "[R]ejections on obviousness grounds cannot be sustained by mere conclusory statements; instead, there must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness." This recitation by the Federal Circuit was cited with approval by the US Supreme Court in the KSR decision (*KSR Int'l Co. v. Teleflex, Inc.*, 82 USPQ2d 1385 (2007)). Furthermore, the appellants point out that "[T]he initial burden of establishing a *prima facie* basis to deny patentability to a claimed invention rests upon the examiner." *Ex parte Levy*, 17 USPQ 2d 1461, 1464 (BPAI 1990); *In re Piasecki*, 223 USPQ 785 (Fed. Cir. 1984).

Moreover, in *Tec Air Inc. v. Denso Manufacturing Michigan Inc.*, 52 USPQ2d 1294 (Fed. Cir. 1999), the court said: "To establish a *prima facie* case of obviousness, Denso must show "some objective teaching in the prior art or that knowledge generally available to one of ordinary skill in the art would lead that individual to combine the relevant teachings of the references." In the present case, there is no objective teaching in the prior art, or in *What is Coconut Milk*, or in that knowledge generally available to one of ordinary skill in the art, that would lead that individual to use the Cajigas disclosure with coconut milk. Furthermore, for a *prima facie* case of obviousness to be established, the applied prior art must be such that it would have provided one of ordinary skill in the art with both a motivation to carry out the claimed invention and a reasonable expectation of success in doing so. *In re Vaeck*, 947 F.2d 488, 493 (Fed. Cir. 1991); *In re O'Farrell*, 853 F.2d 894, 902 (Fed. Cir. 1988). For at least the reason that: the teaching of

Fitzpatrick that its process is not needed for powders having a fat content of less than 10%, the disclosure of Cajigas that its invention relates to yogurt powder, and the fact that yogurt powder has a fat content of much less than 10%, Cajigas and Fitzpatrick do not provide one of ordinary skill in the art with the motivation to carry out the invention of the claims on appeal. For at least the same reason, Cajigas and Fitzpatrick to not provide one of ordinary skill in the art with a reasonable expectation of success in carrying out the invention of the claims on appeal.

The Examiner states that Cajigas does not teach against coconut milk, but the appellants point out that the failure of the reference to specifically teach against something is not the standard for obviousness. There must be some suggestion in the prior art to use the Cajigas process with coconut milk. However, there is no suggestion in the prior art to use the Cajigas process with coconut milk. In fact, one of ordinary skill in the art, using common sense, would not use the Cajigas process with coconut milk, because yogurt is essential to the Cajigas process, and because there is no association between yogurt and coconut milk. It was predictable that applying the method of Cajigas to coconut milk would not produce yogurt. For at least that reason, a person of ordinary skill in the art would have had no motivation to apply the method of Cajigas to coconut milk.

In the first paragraph on page 4 of the Office Action, the Examiner states: "Given that applicant has not provided any evidence to the contrary, i.e. persuasive data, it is the examiner's position that the form of lecithin, either liquid or dry, holds no patentable weight given that both will perform in the same manner once applied to powders." By concluding that something holds no patentable weight, because the applicant has not provided any evidence to the contrary, the Examiner seems to be imposing on the appellants the burden to establish that the invention is patentable rather than recognizing that the law requires the Examiner to establish a *prima facie* 

case that the invention is not patentable. As was stated above, the initial burden of establishing a prima facie basis to deny patentability to a claimed invention rests upon the examiner. Ex parte Levy, 17 USPQ 2d 1461, 1464 (BPAI 1990); In re Piasecki, 223 USPQ 785 (Fed. Cir. 1984). In order to establish a prima facie case, it is the Examiner's burden to establish that spraying lecithin in water or in an aqueous solution onto the powders performs in the same manner as applying lecithin dry to the powders.

In the last paragraph on page 3 of the Office Action, the Examiner states that, as currently written, the claim recites the lecithin and alginate is sprayed onto the powder particles and all is dried. The appellants point out that claim 1 recites "wherein lecithin and alginate in water or an aqueous liquid are sprayed onto the powder particles and dried subsequently". Both "sprayed" and "dried" referred back to the lecithin and alginate. Thus, in claim 1, it is the lecithin and alginate in water or an aqueous liquid that is dried. The Examiner appears to be correct about independent claim 2, in that it recites "wherein lecithin and alginate in water or in an aqueous liquid are sprayed onto the powder particles, the powder particles agglomerate and are dried subsequently".

#### VIII. Conclusion

For the foregoing reasons, the Examiner's rejection of claims 1, 2, 4 and 5 should not be sustained. A decision to that effect is respectfully requested.

The Commissioner is hereby authorized to charge any deficiency in fees or to credit any overpayment in fees to Attorney's Deposit Account No. 50-0562.

Respectfully submitted,

Date: November 7, 2011

/John P. Shannon/ John P. Shannon

Registration No. 29,276

Merek, Blackmon & Voorhees, LLC 673 South Washington Street Alexandria, VA 22314 (703) 684-5633 Customer No. 48234

#### VIII. Claims appendix.

- 1. Method for the instantisation of powders for use in food stuff and animal feed production, the particles of which comprise free surface fat, wherein lecithin and alginate in water or an aqueous liquid are sprayed onto the powder particles and dried subsequently.
- 2. Method for the instantisation of powders for use in food stuff and animal feed production, the particles of which comprise free surface fat, wherein lecithin and alginate in water or in an aqueous liquid are sprayed onto the powder particles, the powder particles agglomerate and are dried subsequently.
  - 4. The method of claim 1, wherein the free surface fat is that of coconut milk powder.
  - 5. The method of claim 2, wherein the free surface fat is that of coconut milk powder.

## IX. Evidence appendix.

"Yogurt Powder Ingredients" from the U.S. Dairy Export Council

## X. Related proceedings appendix.

None.